

REMARKS

Claims 1-20 are pending in the application and stand rejected. Claim 1 has been amended. No new matter is added. In light of the foregoing amendments and the following remarks, Applicants earnestly solicit favorable reconsideration.

On the Merits

Claim Rejections - 35 U.S.C. § 103(a):

Claims 1-20 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over *Oka et al.* (US Patent 5,747,152) in view of *Nishikawa et al.* (US Patent 6,914,540), hereinafter referred to as *Oka* and *Nishikawa* respectively.

Independent Claim 1:

Independent claim 1 requires:

A hard coat film comprising a hard coat layer, which is a cured coat layer, provided on at least one side of a transparent plastic film substrate, wherein

a hard coat layer forming material comprises: urethane acrylate (A); isocyanuric acid acrylate (B) and inorganic ultrafine particles (C), and

a mixing quantity of the isocyanuric acid acrylate (B) is about in the range of from 5 to 25 parts by weight relative to 100 parts by weight of the urethane acrylate (A).

a mixing quantity of the inorganic ultrafine particles (C) is about in the range of from 10 to 60 parts by weight relative to all resin components in a hard coat forming material, and

a difference in refractive index between the transparent plastic film substrate and the hard coat layer is 0.04 or less.

Support for the amendment to claim 1 may be found in paragraphs [0041] and [0044].

It is noted that paragraph [0037] describes that

“all the resin components” are “all the resin components in a hard coat forming material {a total sum of components (A) and (B) or a total sum of the components (A) and (B) and the added resin, if a resin material is further added}”.

Oka discloses using a “urethane resin” for an ionizing radiation curing resin. Column 14, lines 22-25 states that it is particularly preferred to incorporate urethane acrylate or the like as an oligomer and dipentaerythritol hexa (meth)acrylate or the like as a monomer. This disclosure in *Oka* corresponds to comparative Example 2 discussed in the specification on page 69 [paragraph 53].

The Examiner acknowledges that *Oka* does not disclose isocyanuric acid but instead contends that it is disclosed in *Nishikawa*, specifically in column 4, lines 61-68. Here *Nishikawa* discloses “isocyanuric acid” for the hydroxyl group-containing polyfunctional (meth)acrylate.

Nishikawa deals with a laminate and antireflection film. The Examiner contends that it would have been obvious to add the isocyanuric acid to the teaching of *Oka* because such a monomer provides superior antistatic properties, antiscratching properties and transparency. Isocyanuric acid EO modified di(meth)acrylate described in *Nishikawa* pointed out by the Examiner is merely exemplified as the hydroxyl group containing polyfunctional (meth)acrylate in Component (B) (a reaction product of hydroxyl group containing polyfunctional

(meth)acrylate and a diisocyanate compound). Thus, claim 1 of the present application would not be attained by combining the description in *Nishikawa* with the description in *Oka*.

Further, the isocyanuric acid EO modified di(meth)acrylate described in *Nishikawa* corresponds to Component (B) described in *Nishikawa*, namely, the material constituting urethane acrylate in *Oka*. Thus, the description regarding isocyanuric acid EO modified di(meth)acrylate in *Nishikawa* does not serve as support for the use of isocyanuric acid EO modified di(meth)acrylate in addition to urethane acrylate in *Oka*.

Further, the invention disclosed in *Oka* is characterized in that ultrafine particles are localized to form a functional ultrafine particle layer in the upper part of the hard coat layer. Accordingly, the functional ultrafine particle layer provides ultraviolet screening effect, antistatic effect and the like in the invention disclosed in *Oka*.

On the other hand, in the present invention, ultrafine particles are incorporated in the hard coat layer to suppress curling, as described in paragraph [0016]. The reflective indexes of the hard coat layer and the transparent film substrate are preferably small as described in paragraphs [0045] and [0046] and claim 6. Thus, the ultrafine particles are substantially uniformly distributed in the hard coat layer in the present invention, and the hard coat layer of the present invention is not such that ultrafine particles are localized to form a functional ultrafine particle layer as in the invention disclosed in *Oka*.

In addition, *Nishikawa* describes that the second layer, pointed out by the Examiner, has a high reflective index. Thus, *Nishikawa* is different from the present invention in this regard also; (the hard coat layer is positioned between the second layer and the substrate in the disclosure in *Nishikawa*).

Thus, for at least the above-noted reasons, the claimed invention would not have been obvious over the combined teaching of the prior art. However, in order to further distinguish the invention, claim 1 has been amended to set forth mixing quantities of urethane acrylate (A), isocyanuric acid acrylate (B) and inorganic ultrafine particles (C). The combination of prior art fails to teach or suggest these features of the invention.

In view of the above, Applicants respectfully submit that their claimed invention is allowable and ask that the rejection under 35 U.S.C. §103(a) be reconsidered and withdrawn. Applicants respectfully submit that this case is in condition for allowance and allowance is respectfully solicited.

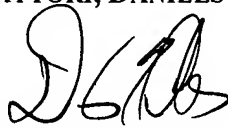
If any points remain at issue which the Examiner feels may be best resolved through a personal or telephone interview, the Examiner is kindly requested to contact the undersigned at the local exchange number listed below.

Application No.: 10/588,548
Art Unit: 1794

Response
Attorney Docket No.: 062869

If this paper is not timely filed, Applicants respectfully petition for an appropriate extension of time. The fees for such an extension or any other fees that may be due with respect to this paper may be charged to Deposit Account No. 50-2866.

Respectfully submitted,
WESTERMAN, HATTORI, DANIELS & ADRIAN, LLP

A handwritten signature in black ink, appearing to read 'D. Hubbs', is positioned above the printed name of the attorney.

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